

## **Guidance on NEPA Issues for DOE's State Energy Program Grants and Energy Efficiency and Conservation Block Grants**

### **Executive Summary**

The Department of Energy (DOE) must comply with NEPA in disbursing financial assistance grants to states, tribes and other recipients for energy conservation and renewable energy programs. The American Recovery and Reinvestment Act requires that both DOE and recipients address the unique challenges of expediting the expenditure of significant funds in a manner that creates and preserves jobs, transforms the nation's infrastructure, restores its economy and complies with a myriad of statutory and regulatory requirements.

The following is guidance that should assist recipients in dealing with NEPA issues that have arisen in the award of grants under the State Energy Program (SEP) and the Energy Efficiency and Conservation Block Grant Program (EECBG). It is important to emphasize that it is guidance – nothing here can alter or negate the requirements of NEPA or its implementing regulations.

### **Contents of Guidance Document**

1. Loan and Grant Programs
2. Individual Determinations for Projects Selected under Loan and Grant Programs
3. NEPA Conditions in Award Documents (Removing or Working with Conditions)
4. Recipients' Responsibilities and "Extraordinary Circumstances"

### **Loan and Grant Programs**

In light of the unprecedented levels of funding available to recipients under these programs, many of them elected to establish loan or grant programs through which they would distribute funds to others. Some recipients established broad programs that would fund everything from retrofitting homes with energy efficient windows to creating large wind farms. Others created several loan or grant programs, each of which was targeted at a particular type of activity – for example, solar hot water heaters for residences.

DOE was able to determine that many of these narrowly focused loan and grant programs would fund activities that were categorically excluded from further NEPA review. However, as to loan and grant programs designed to fund a broad range of projects, many types of projects could require preparation of an environmental assessment (EA) or an environmental impact statement (EIS), and DOE therefore could not categorically exclude the entire program from further NEPA review.

In these cases, the award document imposed a requirement or condition that the recipient had to submit information to DOE that would allow DOE to make an individual NEPA determination for each activity that had not already been excluded. These activities must still fall within the general confines of the revolving loan program as described in the

application. For example, if the application described the loan program as one for state buildings, then home retrofits would not be appropriate because they would not be within the purposes of the loan program as originally approved (even though most residential retrofits are categorically excluded from NEPA review).

### **Individual Determinations for Projects Selected under Loan and Grant Programs**

Entities using a loan or grant program to disburse SEP or EECBG funds should use the questionnaire DOE will provide shortly to obtain the information DOE needs to determine what level of NEPA review is required for a particular project. If a questionnaire is needed immediately, the use of an EF-1 form can be used (although more information may be required). A project can consist of an individual action or a group of similar actions (e.g., installing energy efficient lighting in schools and state buildings). The actions in a group must be so similar that the responses in the questionnaire would be the same for any action in that group.

Entities should provide the responses to questionnaire items before asking the proponent of the project seeking a loan or grant to fill out the remainder of the form. Entities should also consider whether, in designing their loan or grant program, they should limit all or some of their program to actions that are likely to be categorically excluded. In other words, proponents could only seek a loan or grant for a project that does not require further NEPA review.

Assuming that the entity's application included the following types of activities in its description of the loan or grant loan program, these are some of the activities that can be categorically excluded from NEPA review:

- Retrofits of existing buildings or facilities (residential, commercial, industrial, government, academic) with energy efficient equipment. Many types of projects can fall into this category – insulation, LED lighting, HVAC upgrades, weather sealing, ENERGY STAR appliances, replacement of windows and doors, etc. – however, it probably would not include massive expansions of buildings or facilities. For historic structures, it may be necessary that the retrofits maintain the building's historic character (e.g., replacement of windows and doors with appropriate designs).
- Installation of small renewable energy sources located on existing buildings or existing facilities – photovoltaics, wind turbines, solar thermal hot water, geothermal heat pumps, combined heat and power systems. There are no bright lines here, but the following are some rough rules of thumb as to what could be deemed to be small:
  - Photovoltaics – appropriately sized units on existing rooftops and parking shade structures; or 60kW systems or smaller installed on the ground within the boundaries of an existing facility.

- Wind turbines – 20kW or smaller.
- Solar thermal hot water – appropriately sized units for residences or small commercial buildings.
- Geothermal heat pumps – 10 tons of capacity or smaller.
- Geothermal power plants – 300kW or smaller (factors such as open or closed loop and fluid type play a role)
- Combined heat and power systems – systems sized to boilers appropriate to the buildings in which they are located.
- Hydropower – because of the site-specific issues relating to hydropower systems and the fact that they are rarely installed at the facility they serve, it is unlikely that they can be deemed small without additional information.

Individual systems larger than those above may be categorically excluded based on additional information provided by the applicant regarding a specific installation. Very large renewable energy systems (e.g., wind farms or district geothermal heat systems) that serve many customers built on a green field site would definitely not fall within a categorical exclusion; nor would a large facility comprising many small sources. Finally, installing any renewable energy system on a historic structure could require further consideration under the National Historic Preservation Act or other statutes.

- Energy efficient or renewable energy-powered emergency systems (lighting, cooling, heat, shelter) installed in existing buildings and facilities.
- Alternative fueling tanks and systems installed on existing facilities (but not a large biorefinery); purchase of alternative fuel vehicles.
- Training programs.
- Research, data gathering and analysis; promulgating new building codes.
- Financial incentive programs – rebates and energy savings performance contracts for existing facilities or for energy efficient equipment, provided that the incentives are not so large that they would be deemed to be grants that essentially create projects that would not otherwise exist. For example, giving a wind farm that cost \$100 million a sum of \$50 million and calling it a rebate would not fall within such a categorical exclusion; a 10% rebate on the purchase and installation of energy-efficient windows would.

These are the vast majority of activities that DOE categorically excluded in SEP applications. For the EECBG program, DOE identified nine categories of activities in the funding opportunity announcement that most likely would fit within categorical exclusions from further NEPA review (see Table 1's non-bolded activities). DOE has completed the review of several hundred EECBG applications and has determined that

most of the proposed activities within these and other categories listed in the FOA are categorically excluded from further NEPA review.

On the other hand, large projects (especially controversial ones) on green field sites or sites of special interest (ecological, historical, cultural; see “integral conditions” at the beginning of Appendix B of DOE’s NEPA regulations) – wind farms, large solar arrays, refineries, power plants, pipelines, etc. – would probably require EAs or EISs. Many states included long lists of projects they might fund under their loan or grant programs, or prefaced their lists of potential projects with phrases such as “including but not limited.” DOE had to impose conditions on such potentially broad programs.

### **NEPA Conditions in Award Documents (Removing or Working with Conditions)**

As noted above, DOE had to impose conditions (“prohibitions”) in award documents when it could not determine the type of NEPA review needed either because the application did not provide enough information about the proposed project or, in the case of loan and grant programs, the projects had yet to be determined. There seems to be a misunderstanding as to the need to “clear conditions” in order to release funding. That is not the case *if* the award document lists exemptions to a prohibition. These exemptions are the activities that were categorically excluded from further NEPA review based on the NEPA Compliance Officer’s review of the application. To use funding on specific activities or whole market titles that are conditioned with a prohibition, you must first clear conditions by working with your DOE project officer and NEPA advisor to categorically exclude the activity or complete an EA/EIS (Each major activity a recipient sought funding for is called a “Market Title” on SEP and an “Activity” on EECBG; we will use “market title” in the text as an all inclusive term for both the EECBG activity and the SEP market title). If there are no prohibitions in an award document as to a market title, there is no need for further review under NEPA.

For example, one entity proposed a grant program that would fund a wide range of activities. The NEPA Compliance Officer determined that some of these activities were categorically excluded: “building retrofits, energy education outreach, solar outdoor lighting, and photovoltaic emergency back-up power.” The award document for this market title states:

Prohibited project activities include:

1. Discretionary Grant Program; all activities *except* building retrofits, energy education outreach, solar outdoor lighting, and photovoltaic emergency back-up power (on existing structures or within existing facilities).

In other words, these activities (“building retrofits, energy education outreach, solar outdoor lighting, and photovoltaic emergency back-up power (on existing structures or within existing facilities)”) are not prohibited, do not require further NEPA review, and can receive grants as soon as the recipient decides which of these projects it intends to

fund. What would require further NEPA review before receiving a grant would be any projects not within the excepted activities that the recipient decides to give a grant to under this program.

The second important concept is that this recipient could spend *all* of the money allocated to this grant program on these excepted activities (building retrofits, energy education outreach, solar outdoor lighting, and photovoltaic emergency back-up power (on existing structures or within existing facilities)). It doesn't need to prorate or allocate money within that program to any other activity even if its application said it might fund such activities.

Finally, recipients may move money from one market title to another. A particular loan program would be one market title; a particular training program would be a separate market title. Recipients were free (within certain limits) to include as many or as few market titles in their applications as they wanted, and to allocate money to each title as they saw fit. If they want to change those allocations after award, they need to submit an email to DOE that clearly records what they intend to do. This will allow a recipient to spend more funds on authorized activities, within its total approved SEP or EECBG budget.

However, a recipient cannot do the following without filing a revised application and obtaining a revised award document:

1. Remove a NEPA condition on an activity.
2. Add new categories of activities to a market title that were not in the original application. For example, if a market title described a loan program for home retrofits, a recipient cannot start giving loans to biorefineries or wind farms under that program without revising its application.
3. Add new groups of categorically excluded activities to a market title. Recipients can either (a) seek individual NEPA determinations for each activity (or a group of identical activities) that was not categorically excluded in the award document; or (b) revise their application to include these groups and ask DOE to confirm that the activities in these groups would be categorically excluded. In (b), DOE would issue a revised award document.

In summary, there are two paths recipients can follow:

First path – Comply with the condition in the award document by

A. Spending all of the money in a market title on activities DOE categorically excluded from further NEPA review on the basis of the original application; or

B. Spending some of the money on the categorically excluded activities and seeking individual NEPA determinations from DOE on other activities that the recipient wishes to fund (some of these determinations might be CXs, some might be EAs, and some EISs).

Under this approach, there would be no change to the application or to the conditions (prohibitions) imposed in the award document – the recipient would "live" with the condition.

Second path – Revise the applications and seek a new award document in order to:

- A. Remove a NEPA-based prohibition from a particular market title;
- B. Obtain an expanded list of categorically excluded activities within a market title; or
- C. Add new types of activities for funding (by adding a new market title or expanding the scope of an existing market title).

Under this approach, DOE would issue a new award document that might not have a prohibition, or that might have different prohibitions.

### **Recipients' Responsibilities and "Extraordinary Circumstances"**

DOE's categorical exclusions are not absolute – actions within those exclusions that involve "extraordinary circumstances" may require further NEPA review (i.e., preparation of an EA or EIS). In granting categorical exclusions based on descriptions in recipients' applications for SEP and EECBG grants, DOE based its decisions on the lack of such circumstances. Recipients – particularly in developing and implementing loan and grant programs using SEP or EECBG – need to be aware of and guard against funding projects that present extraordinary circumstances that might require further NEPA review. These circumstances "include unique circumstances presented by [a specific proposal] such as scientific controversy about the environmental effects of the proposal," or "uncertain effects or effects involving unique or unknown risks" 10 C.F.R. § 1021.410(b)(2). Recipients should review section 1021.410(b) and contact DOE if they identify projects that appear to present extraordinary circumstances and therefore would not be categorically excluded from further NEPA review.

Table 1: NEPA Requirements by EECBG Project Activities		
<b>Key</b> Regular Text: Activities Not Requiring NEPA Review <b>Bolded Text:</b> Activities Requiring NEPA Review		
ACTIVITY NUMBER	ACTIVITY DESCRIPTION	NEPA ACTION REQUIRED AT THIS TIME
1.	development and implementation of an energy efficiency and conservation strategy under section 545(b);	No further action needed at this time
2.	retaining technical consultant services to assist the eligible entity in the development of such a strategy, including— A. formulation of energy efficiency, energy conservation, and energy usage goals; B. identification of strategies to achieve those goals— (i) through efforts to increase energy efficiency and reduce energy consumption; and (ii) by encouraging behavioral changes among the population served by the eligible entity; C. development of methods to measure progress in achieving the goals; D. development and publication of annual reports to the population served by the eligible entity describing— (i) the strategies and goals; and (ii) the progress made in achieving the strategies and goals during the preceding calendar year; and E. other services to assist in the implementation of the energy efficiency and conservation strategy;	No further action needed at this time
3.	residential and commercial building energy audits;	No further action needed at this time
4.	<b>establishment of financial incentive programs for energy efficiency improvements;</b>	<b>Complete NETL F 451.1-1/3-EECBG and submit with application</b>
5.	<b>the provision of grants to nonprofit organizations and governmental agencies for the purpose of performing energy efficiency retrofits;</b>	<b>Complete NETL F 451.1-1/3-EECBG and submit with application</b>
6.	development and implementation of energy efficiency and conservation programs for buildings and facilities within the jurisdiction of the eligible entity, including— A. design and operation of the programs; B. identifying the most effective methods for achieving maximum participation and efficiency rates; C. public education; D. measurement and verification protocols; and E. identification of energy efficient technologies;	No further action needed at this time
7.	development and implementation of programs to conserve energy used in transportation, including— A. use of flex time by employers; B. satellite work centers; C. development and promotion of zoning guidelines or requirements that promote energy efficient development;	No further action needed at this time
	<b>D. development of non-highway transportation infrastructure, such as bike lanes and pathways and pedestrian walkways;</b>	<b>Complete NETL F 451.1-1/3-EECBG and submit with application</b>
	E. synchronization of traffic signals; and F. other measures that increase energy efficiency and decrease energy consumption;	No further action needed at this time
8.	development and implementation of building codes and inspection services to promote building energy efficiency;	No further action needed at this time
9.	application and implementation of energy distribution technologies that significantly increase energy efficiency, including—	No further action needed at this time

	A. distributed resources; and B. district heating and cooling systems;	
10.	activities to increase participation and efficiency rates for material conservation programs, including source reduction, recycling, and recycled content procurement programs that lead increases in energy efficiency;	No further action needed at this time
11.	<b>the purchase and implementation of technologies to reduce, capture, and, to the maximum extent practicable, use methane and other greenhouse gases generated by landfills or similar sources;</b>	<b>Complete NETL F 451.1-1/3-EECBG and submit with application</b>
12.	replacement of traffic signals and street lighting with energy efficient lighting technologies, including— A. light emitting diodes; and B. any other technology of equal or greater energy efficiency;	No further action needed at this time
13.	<b>development, implementation, and installation on or in any government building of the eligible entity of onsite renewable energy technology that generates electricity from renewable resources, including—</b> <b>A. solar energy;</b> <b>B. wind energy;</b> <b>C. fuel cells; and</b> <b>D. biomass; and</b>	<b>Complete NETL F 451.1-1/3-EECBG and submit with application</b>
14.	<b>any other appropriate activity, as determined by the Secretary, in consultation with—</b> <b>A. the Administrator of the Environmental Protection Agency;</b> <b>B. the Secretary of Transportation; and</b> <b>C. the Secretary of Housing and Urban Development.</b>	<b>Complete NETL F 451.1-1/3-EECBG and submit with application</b>